

## ABSTRACT

The present invention pertains to a DNA encoding a polypeptide comprising an entire sequence of the amino acid sequence as shown by SEQ ID NO: 17 of Sequence Listing or a partial sequence thereof, or a polypeptide comprising the polypeptide described above, wherein any of the polypeptides has an activity of a receptor capable of binding to a murine PBSF/SDF-1; a polypeptide encoded by the DNA described above, wherein the polypeptide has an activity of a receptor capable of binding to a murine PBSF/SDF-1; cells expressing the polypeptide described above and a human CD4 protein; and a method of screening an AIDS onset inhibitor or an HIV-1 infection inhibitor, characterized by the use of the cells described above. According to the present invention, there can be provided a novel murine CXC chemokine receptor gene, a method of screening an HIV-1 infection inhibitor, and the like, each of which is useful in studies of a therapeutic agent for AIDS and the functional mechanism of HIV-1 infection.